What is claimed is:

1. A medical navigation system for controlling the distal end of an elongate flexible medical device in a subject's body, the system comprising:

an elongate flexible medical device together with an electronic identification device for elongate flexible medical device identification;

a navigation device for actuating the distal end of an elongate flexible medical device and thereby changing its orientation;

an electronic interface for selectively operating the navigation device for selectively controlling the orientation of the distal end of the elongate flexible medical device, the electronic interface comprising a processor and at least one software program that enables navigation control only in the presence of the electronic identification device.

2. The medical navigation system according to claim 1 wherein the electronic identification device includes a memory, and wherein the interface includes a reader for reading the memory.

3. The medical navigation system according to claim 1 wherein the electronic identification device includes a memory unit and a processing unit that communicates with the interface for transferring information.

4. The medical navigation system according to claim 2 wherein the memory contains unique identifying information about the type of device, and wherein the interface includes a database of the unique identifying information of the type of devices with which the interface is intended to operate.

5. The medical navigation system according to claim 3 wherein the memory contains unique identifying information about the type of device, and wherein the interface includes a database of the unique identifying information of the type of devices with which the interface is intended to operate.

6. The medical navigation system according to claim 1 wherein the electronic identification device is a circuit that is connected to the interface.

7. The medical navigation system according to claim 1 wherein the electronic identification device is a smart card with magnetically stored information that can be electronically read into the interface.

8. The medical navigation system according to claim 2 wherein the memory contains unique identifying information about the device, and wherein the interface includes a database of the unique identifying information for devices with which the interface is intended to operate.

9. The medical navigation system according to claim 3 wherein the memory contains unique identifying information about the device, and wherein the interface includes a database of the unique identifying information for devices with which the interface is intended to operate.

10. The medical navigation system according to claim 1 wherein the electronic identification device is a RF circuit that transmits a signal to the interface.

11. The medical navigation system according to claim 1 wherein the interface includes a plurality of programs, each adapted for use with a different type of elongate flexible medical device, each program operating only when an electronic identification device for the particular type of elongate flexible medical device is present.

12. The medical navigation system according to claim 1 wherein the electronic identification device includes an integrated circuit.

13. The medical navigation system according to claim 1 wherein the interface operates on the electronic identification device to prevent reuse of the elongate flexible medical device.

14. The medical navigation system according to claim 1 wherein the interface tracks elapsed time of use of the identified elongate flexible medical device and invalidates use of the identified elongate flexible medical device when the elapsed time exceeds a pre-defined limit.

15. The electronic identification device according to claim 3 wherein the processing unit operates on the memory unit to prevent reuse of the elongate flexible medical device.

16. The medical navigation system according to claim 1 wherein the electronic identification device includes memory, and wherein the interface adds to or deletes information stored on the memory to prevent reuse of the device.

17. The medical navigation system according to Claim 1 wherein the at least one software program controls navigation by employing a computational model of flexible device physics.

18. A method of securing a medical navigation system from unauthorized use, the method comprising preventing the operation of at least one computer program of the medical navigation system except in the presence of an elongate flexible medical device having an electronic identification device.

19. The method of securing a medical navigation system from unauthorized use according to claim 18, further comprising altering the identification device after use of the medical device, to prevent reuse of the medical device.

20. A method of automatically adapting a medical navigation system for navigating the distal end of an elongate medical device, the method comprising reading a memory associated with the elongate device, and adapting the system based at least in part from the memory.

21. The method according to claim 20 wherein the step of adapting the system comprises running a program for the particular device as determined from the information read from the memory.

22. The method according to claim 20 wherein the step of adapting the system comprises using properties of the particular device as determined from the information read from the memory, in a program for navigation control.

23.A medical navigation system for navigating the distal end of an elongate flexible medical device inside a subject's body, the system comprising an elongate flexible medical device; a navigation device for actuating and orienting the distal end of the elongate medical device; an interface comprising a processor and at least one software program for selectively controlling the navigation device to selectively orient the distal end of the elongate medical

device, the improvement comprising an electronic identification device provided with the elongate flexible medical device, which enables at least one navigation control software program of the interface to function.

24. The medical navigation system according to claim 23 wherein the at least one software program controls navigation by employing a computational model of flexible device physics.

25. The medical navigation system according to claim 23 wherein the electronic identification device includes a memory, and wherein the interface is adapted to read the memory.

26. The medical navigation system according to claim 23 wherein the electronic identification device is in the form of a smart card with magnetically stored information, and wherein the interface can access this information through the use of an electronic smart card reader.

27. The medical navigation system according to claim 23 wherein the electronic identification device is an integrated circuit including a memory, which is connected to the interface.

28.A medical navigation system for navigating the distal end of an elongate flexible medical device inside a subject's body, the system comprising an elongate flexible medical device; a navigation device for actuating and orienting the distal end of the elongate flexible medical device; an interface comprising a processor and at least two software programs each adapted for controlling the navigation device for a specific type of elongate flexible medical device to selectively orient the distal end of the elongate flexible medical device, the improvement comprising an electronic identification device provided with the elongate flexible medical device, which enables the appropriate navigation control software program for the particular medical device of the interface to function.

29. The medical navigation system according to claim 28 wherein at least one of the at least two software programs controls navigation by employing a computational model of flexible device physics.

30. The medical navigation system according to claim 28 wherein the electronic identification device includes a memory, and wherein the interface is adapted to read the memory.

31. The medical navigation system according to claim 28 wherein the electronic identification device is in the form of a smart card with magnetically stored information, and wherein the interface can access this information through the use of an electronic smart card reader.

32. The medical navigation system according to claim 28 wherein the electronic identification device is an integrated circuit including a memory, which is connected to the interface.

33. A medical navigation system for navigating the distal end of an elongate flexible medical device inside a subject's body, the system comprising an elongate flexible medical device; a navigation device for actuating and orienting the distal end of the elongate flexible medical device; an interface comprising a processor and at least one software program for selectively controlling the navigation device to selectively orient the distal end of the elongate flexible medical device, the improvement comprising an electronic identification device provided with the elongate flexible medical device, which provides information for the software program about the properties of the medical device.

34. The medical navigation system according to claim 33 wherein the at least one software program controls navigation by employing a computational model of flexible device physics.

35. The medical navigation system according to claim 33 wherein the electronic identification device includes a memory, and wherein the interface is adapted to read the memory.

36. The medical navigation system according to claim 33 wherein the electronic identification device is in the form of a smart card with magnetically stored information, and wherein the interface can access this information through the use of an electronic smart card reader

37. The medical navigation system according to claim 33 wherein the electronic identification device is an integrated circuit including a memory, which is connected to the interface.

38. A medical navigation system for controlling the distal end of an elongate medical device in the body of the patient;

an elongate flexible medical device;

a memory device provided with the flexible medical device;

a control system for controlling the position and/or orientation of the distal end of the elongate medical device;

an interface for accepting inputs from the user to cause the control system to selectively change the position and/or orientation of the elongate medical device; the interface sending instructions to the control system dependent in part upon information obtained from the memory device.

39. The medical navigation system according to claim 38 wherein the interface incorporates a software program that controls navigation by employing a computational model of flexible device physics.

40. The system according to claim 38 wherein the memory device includes storing unique device identification information for the elongate flexible medical device, and wherein the interface includes a database of unique device identification information and corresponding device properties, and wherein the instructions sent to the control system take into account the device properties determined from the database.

41. The system according to claim 38 wherein the memory device includes information identifying the type of device as well as device properties, and wherein the instructions sent to the control system take into account the device properties determined from the memory device.

42. A method of controlling an elongate flexible medical device inside a subject's body with a control system for controlling the position and/or orientation of the distal end of the elongate flexible medical device, the method comprising:

inputting information about the desired position and/or orientation to an interface which controls the control system based upon the input information and information about the properties of the device based on information read from a memory incorporated with the elongate flexible medical device.

43. The method according to claim 42 wherein the interface incorporates at least one software program that controls navigation by employing a computational model of flexible device physics.

44. A method of controlling an elongate flexible medical device inside a subject's body with a control system for controlling the position and/or orientation of the distal end of the elongate flexible medical device, the method comprising:

accepting inputs of information about the desired position and/or orientation to an interface;

determining information about the elongate flexible medical device from a memory provided with the device;

sending a control signal from the interface to the control system based upon the input information about the desired position and/or orientation of the distal end and the determined properties of the medical device.

45. The method according to claim 44 wherein the interface incorporates at least one software program that controls navigation by employing a computational model of flexible device physics.

46. The method according to claim 44 wherein the step of determining information about the elongate flexible medical device from a memory provided with the device comprises reading a unique device identifier from the memory, and determining the medical device properties from a database based upon the unique device identifier.

47. The method according to claim 44 wherein the step of determining information about the elongate flexible medical device from a memory provided with the device comprises reading

a device type identifier from the memory, and determining the medical device properties from a database based upon the device type identifier.

48. The method according to claim 44 wherein the step of determining information about the elongate flexible medical device from a memory provided with the device comprises reading data corresponding to device properties from the memory.